

CLAIM LISTING

1-10. (canceled)

11. (currently amended) A method for performing a mobile communication signal search using a multipath signal searcher, the multipath signal searcher including a number of search paths searching for the mobile communication signal in a search window defined by a plurality of time offsets, the method comprising the steps of:

identifying a first group of time offsets and a second group of time offsets, where said first group of time offsets and said second group of time offsets are distributed across said search window;

assigning each one of said first group of time offsets to one of a first group of said search paths;

assigning each one of said second group of time offsets to one of a second group of said search paths;

commencing at a first time, simultaneously searching each of said first group of search paths for said mobile communication signal over a first integration period;

commencing at a second time which is offset from said first time, simultaneously searching each of said second group of search paths for said mobile communication signal over a second integration period, wherein said first group of time offsets comprise only even time offsets and wherein said second group of time offsets comprise only odd time offsets.

12. (canceled)

13. (original) The method of claim 11, wherein said first group of time offsets are distributed across said search window evenly, such that the spacing between time offsets in said first group of time offsets is identical and wherein said second group of time offsets are distributed across said search window evenly, such that the spacing between time offsets in said second group of time offsets is identical.

14. (canceled)

15. (original) The method of claim 11, wherein the first integration period and the second integration period have equal duration in time.

16. (original) The method of claim 15, wherein the offset between said first time and said second time is one half of said duration in time.

17. (original) The method of claim 16, further comprising the steps of:
after said first integration period, sorting and ranking output signals from each search path of said first group of search paths to produce a best set of time offsets; and
communicating said best set of time offsets to a finger manager for operating a plurality of finger demodulators to receive said mobile communication signal.

18. (original) The method of claim 16, further comprising the steps of:
after said second integration period, sorting and ranking output signals from each search path of said second group of search paths to produce a best set of time offsets; and
communicating said best set of time offsets to a finger manager for operating a plurality of finger demodulators to receive said mobile communication signal.